

Malnourished Under-Five Children Feeding Practices in Cipacing Village 2012

Shinta Tresna Fujianti¹, Dewi Marhaeni Diah Herawati², Fiva Aprilia Kadi³

¹Faculty of Medicine, Universitas Padjadjaran, ²Departement of Medical Nutrition, Faculty of Medicine, Universitas Padjadjaran, ³Departement of Child Health, Faculty of Medicine, Universitas Padjadjaran/Dr. Hasan Sadikin General Hospital, Bandung

Abstract

Background: Maternal parenting, especially feeding practices, is very important in childhood period and may affect the child's nutritional state. Proper nutrition affects the growth and development of children. The aim of this study is to describe parenting feeding practices in malnourished under-five children.

Methods: A descriptive study on 43 mothers with malnourished under-five children aged 12–59 months was performed in Cipacing Village, Jatinangor, Sumedang during the periode of October–November 2012.

Results: The composition of children based on their malnutrition status and description on good and poor parenting were presented in the result. Twenty two children (51.2%) were severely under nourished, 18 children (41.9%) were under nourished, and 3 children (7%) experienced overweight. Good maternal parenting was identified in child nurturing (86%), feeding frequency (93%), feeding style (62.8%), and situation of feeding (74.4%) while poor maternal parenting was observed in feeding time (55.8%) and types of food given (51.2%).

Conclusions: Maternal parenting plays an important role in children nutrition status.

Keywords: Children, feeding practice, malnutrition, maternal parenting.

Introduction

Indonesia experiences the multiple nutritional problems which was the problem of undernutrition still not handled thoroughly and then a new problem arises. It is the problem of overnutrition.¹ Malnutrition is more common in infants and children. This is an important issue because children are vulnerable and their growth and development will affect the quality of adolescence and adulthood.² At the children age, it occurs a brain cells development that can later affect the intelligence of the children. Provided proper nutrition greatly affects on the growth of brain cells so in the malnourished children, the brain cell growth was inhibited itself then it could make the weight of the brain and brain cell size reduced resulting in the stunted growth and development.^{3,4} In adequate nutritional intake can inhibit growth and affect the quality of child which in turn can reduce the quality of human resources.⁵

Malnutrition has a very complex dimension, and can be caused by many things, both internal and external. Externally, one of which can be caused by maternal parenting.^{6,7} Optimal development of children depends on how mothers take care their children. Maternal parenting is an evident from how the mother give a sense of security and protection to the child, feeding the child and providing an access to the health care.^{6,8}

According to Soekirman in the study of Listyawati⁹, maternal parenting is the behavior of mother in proximity to the child in terms of feeding, hygiene, and giving love. Parenting also associates to the mother's condition in terms of physical and mental health proximity, nutrition, education and knowledge of good parenting.

National Basic Health Research (Riskesmas) in West Java Province¹⁰ shows the events data severe under nutrition occurs approximately 3.1%, 9.9% under nutrition and 5.4% over nutrition. Severe under nutrition and under

Correspondence: Shinta Tresna Fujianti, Faculty of Medicine, Universitas Padjadjaran, Jalan Raya Bandung-Sumedang Km.21, Jatinangor, Sumedang, Indonesia, Phone: +628122401052 Email: shintatresna@gmail.com

nutrition occurs about 13.49% in the year 2007 in Sumedang. There are about 10.20% of malnutrition cases in Jatinangor and most numerous in the Cipacing village about 85 children suffered under nutrition and 21 children suffered over nutrition.

This study aims to describe maternal parenting in the feeding practices of under-five children who suffered the malnutrition, severe under nutrition, under nutrition and over nutrition in the Cipacing village.

Methods

A descriptive study was conducted by collecting the data in Cipacing village, Jatinangor, Sumedang during the period of October–November 2012. Forty three mothers with malnourished children aged 12–59 months were identified according to inclusion criteria as listed: 1) Mothers who have children aged 12–59 months with severe undernutrition, under nutrition or overnutrition, 2) Children who do not have any diseases that affect nutritional status, such

as infectious disease, HIV /AIDS, etc. Primary data were collected to measure the nutrition status and maternal parenting practices.

The assessment of nutritional status was performed using anthropometric measurement in the children by weight for age index. The body weight was measured using the scales and compared to the age at the day of data collection in months.^{1,11} Maternal parenting data were collected through the interviews using a questionnaire that include child nurturing, types of food given, feeding time, feeding frequency, feeding style and situation of feeding.

Data on the characteristics of the children malnutrition were dicovered by group of age, sex and nutritional status. Maternal characteristics were seen by group of age (years), number of children, education level, occupation and income. Twenty questions about parenting in feeding practices were asked in six categories. The scores of 4, 3, 2, and 1 were assigned to A, B, C, and D, respectively. From the total score of all respondents , a mean value was calculated. The individual data were then compared to the mean, if the

Table 1 Characteristics of Respondents

Category	f (%)
Age (years)	
<20	1 (2)
20–35	32 (74)
>35	10 (23)
Number of Children	
< 2	29 (67)
2–4	9 (21)
>4	5 (12)
Level of Education	
Elementary	11 (26)
Junior High	19 (44)
Senior High	13 (30)
Occupation	
Labor	6 (14)
Housewife	34 (79)
Entrepreneur	3 (7)
Income (Rupiah)	
< 1,007,500	25 (58)
>1,007,500	18 (42)

Table 2 Characteristics of Children

Category	f (%)
Age (months)	
12-23	7 (16.3)
24-35	13 (30.2)
36-47	13 (30.2)
48-59	10 (23.3)
Sex	
Male	22 (51.2)
Female	21 (48.8)
Nutritional Status	
Severe Undernutrition	22 (51.2)
Undernutrition	18 (41.9)
Overnutrition	3 (7)

score was less than the average the parenting was considered poor and if it is more than the average , the parenting was good. The nutritional status of children was assessed with a Z-score of the weight for age chart. The data collected were then analyzed using a frequency distribution.

Results

The majority of the respondents was between 20-35 years old (74.4%) and had less than two children (67.4%). Respondents were generally graduated from junior high school (44.2%) and the amount of family income was still below the majority of the regional minimum wage Sumedang which is less than Rp1,007,500,00 (58.1%).

The majority of children in this study was between 24-35 months and 36-47 months (30.2%) while the majority of the nutritional status was severe undernutrition (51.2%).

Maternal parenting feeding practices were assessed in 6 categories. The results were divided into the good and poor categories (Table 3).

From this study, the composition of food given to the children was identified. The majority of children were given rice and snacks (82%). Furthermore, there was a small percentage (9%) of children who were given a fast food. Only 9% of children received rice, vegetables, and fruit. In general, children were fed when they asked for food (54%).

Discussion

The percentage of children with malnutrition in this study is higher than the data from Riskesdas.¹² This condition can be caused by the differences in the time, population and sample studied. Socio-economic factors such as low education level and small family income may influence the children malnutrition.¹

Childhood period is a period when the children should receive proper nutrition.⁵ This can only be achieved through good maternal parenting. This is consistent with a study conducted by Suranadi¹³ that good parenting can optimize the growth and development of children, both on physically and mentally. Contrary, poor parenting of the mother could causes inadequate nutrition intake resulting in children malnutrition.

The majority of mothers in this study practices is the good child nurturing. This means that parents in Cipacing village know that better parenting can be achieved if the parents are the ones who do the parenting. Parenting is the responsibility of both parents including father and mother.¹⁴

Based on the type of food given, the majority of maternal parenting were classified in the poor category. In children with severe undernutrition and undernutrition, the mothers only give rice and snacks. Meanwhile, children with over nutrition receive the full meals including rice, snacks, vegetables and fruits. This is not appropriate for feeding children over one year old, where the food given should be different from the food given to adults and with good variation.^{4,15} This mismatch can affect the nutritional state of children.

Based on the type of food given, the majority of maternal parenting were classified in the poor category. In children with severe undernutrition and undernutrition, the mothers only give rice and snacks. Meanwhile, children with over nutrition receive the full meals including rice, snacks, vegetables and fruits. This is not appropriate for feeding children over one year old, where the food given should be different from the food given to adults and with good variation.^{4,15} This mismatch can affect the nutritional state of children.

The majority of feeding time in this study was poor. The Mother fed the child with no specific schedule. Children were fed when they asked for food. This habit may have occurred because the mother did not have any knowledge about the concept of the food

Table 3 Distribution Children Based on Diversity in Maternal Parenting Feeding Practice

Maternal Parenting Feeding Practice	Poor	Good
	f (%)	f (%)
Child Nurturing	6 (14)	37 (86)
Types of food given	22 (51.2)	21 (48.8)
Feeding Time	24 (55.8)	19 (44.2)
Feeding Frequency	3 (7)	40 (93)
Feeding Style	16 (37.2)	27 (62.8)
Situation of Feeding	11 (25.6)	32 (74.4)

amount needed by children so the mothers feed the children when they seem like they want to eat.¹⁶ The mother should make a feeding schedule for the children. Eating on a regular schedule may form the good habits for children.

The majority of mothers fed the children three times a day with snacks between meals. Feeding frequency is a category of parenting that can affect the nutritional status of children. The main foods are given 3 times a day: morning, noon and evening, with 2 snack times in between main meals.¹⁵

Maternal parenting based on the feeding style was good. Mother kept persuading her child to eat even though her child did not want to eat. The mother can persuade her child to eat by bringing the children to play while mother feeds the child or perhaps by giving food preferred by children.¹⁵ However, there are also mothers who do not persuade their children to eat when they do not want to eat. As a result, the children do not receive enough food.¹⁶

Limitation of this study is the small sample size and the lack of comparison with children without malnutrition. As a conclusion, a good maternal parenting is observed for the child nurturing, feeding frequency, feeding style and the situation of child feeding. Meanwhile, a poor maternal parenting is observed for the type of food given and the time of feeding. Mother, as the primary caregiver and the closest person to the child, especially in childhood, should consider a better parenting in the feeding practices especially in the types of food given and the feeding time. Village health workers, midwives and cadres should provide a counseling about a good parenting in a feeding practice in terms of child nurturing, types of food given, feeding time, feeding frequency, feeding style, and situation of feeding for the mother in order to reduce the incidence of malnutrition in the village.

References

1. Supriasa IDN, Bakri B, Fajar I. *Penilaian status gizi*. Jakarta: EGC; 2001.
2. Alderman H, Shekar M. Nutrition, food security, and health. In: Kliegman RM, Stanton BF, St Geme J, Schor NF, Behrman RE, editor. *Nelson Textbook of Pediatrics*. 19th ed. Philadelphia: Elsevier Saunders; 2011. p.170–6.
3. Widjaja MC. *Gizi tepat untuk perkembangan otak & kesehatan balita*. Jakarta: Kawan Pustaka; 2007.
4. Sutarno B, Anggraini DY. *Menu sehat alami untuk balita & balita*. Jakarta: Agromedia Pustaka; 2010.
5. Soetjiningsih, Suandi I. Gizi untuk tumbuh kembang anak. In: Soetjiningsih, editor. *Tumbuh kembang anak dan remaja*. Jakarta: Sagung Seto; 2010. p.22–40.
6. Riyadi H. Faktor-faktor yang mempengaruhi status gizi anak balita di Kabupaten Timor Tengah Utara Propinsi Nusa Tenggara Barat. *Gizi dan Pangan*. 2011;6:66–73.
7. Ventura AK, Birch LL. Does parenting affect children's eating and weight status?. *Int J Behav Nutr Phys Act*. 2008;5:15.
8. Anwar HM. Peranan gizi dan pola asuh dalam meningkatkan kualitas tumbuh kembang anak. *Seminar Sehari Departemen Kesehatan Republik Indonesia*. Jakarta; 4 November 2000 [Cited 7 May 2012]; Available at: <http://bocareyou.blogspot.com/2009/05/peranan-gizi-dan-pola-asuh-dalam.html>.
9. Listyowati LD. Peran pola asuh keluarga pada balita gizi buruk dan gizi kurang. 2011 [downloaded in 6 May 2012]; Available at: <http://alwaysnutritionist.blogspot.com/2012/03/peran-pola-asuh-keluarga-pada-balita.html>.
10. Dinas Kesehatan Provinsi Jawa Barat. *Tabel*

- profil kesehatan Provinsi Jawa Barat tahun 2007. Bandung: Dinas Kesehatan Provinsi Jawa Barat; 2008.
11. Hendarto A, Sjarif DR. Antropometri anak dan remaja. In: Soetjiningsih, editor. *Nutrisi pediatrik dan penyakit metabolik*. Jakarta: Ikatan Dokter Anak Indonesia; 2011. p.23–35.
 12. Kementerian Kesehatan Republik Indonesia. Riset kesehatan dasar (Riskesdas) 2010. Jakarta: Badan Penelitian dan Pengembangan Kesehatan Kementerian Kesehatan Republik Indonesia; 2010.
 13. Suranadi L. Studi tentang karakteristik keluarga dan pola asuh pada balita gizi kurang dan gizi buruk di Kabupaten Lombok Barat. *Jurnal Kesehatan Prima*. 2008;2(2):296–303.
 14. Soetjiningsih. *Tumbuh kembang anak*. Jakarta: EGC; 1995.
 15. Pudjadi S. *Ilmu gizi klinis pada anak*. Jakarta: Gaya Baru; 2001.
 16. Suhardjo. *Pemberian makanan pada bayi dan anak*. Jakarta: Kanisius; 2010.